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Production and Marketing of CHRISTMAS TREES

in the
PACIFIC NORTHWEST
in
1957

by THOMAS C. ADAMS
and MARTIN L. SYVERSON



PACIFIC NORTHWEST
FOREST AND RANGE EXPERIMENT STATION
U. S. DEPT. OF AGRICULTURE • FOREST SERVICE

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During the 1957 season, a survey was made of Christmas tree production and marketing in the Pacific Northwest. This survey was made in cooperation with the Oregon State Board of Forestry and the Washington State Department of Natural Resources, who collected most of the basic information. Additional information was obtained through national forest supervisors and the Federal Cooperative Extension Service, Oregon State College. Results were compiled by the Pacific Northwest Forest and Range Experiment Station and the Portland regional office of the U. S. Forest Service.

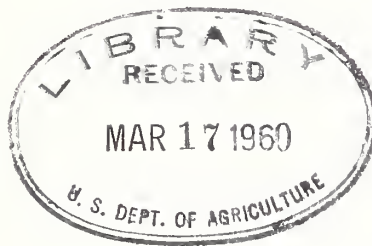
PRODUCTION AND MARKETING
OF CHRISTMAS TREES
IN THE PACIFIC NORTHWEST IN 1957

by

Thomas C. Adams, Research Forester
Pacific Northwest Forest and Range Experiment Station

and

Martin L. Syverson, Forester
Pacific Northwest Region, U. S. Forest Service



October 1958

PACIFIC NORTHWEST
FOREST AND RANGE EXPERIMENT STATION
R. W. Cowlin, Director Portland, Oregon

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MARKETING

Nearly every family in the Nation obtains a Christmas tree during the 3 or 4 weeks preceding Christmas. However, few persons appreciate the effort involved in arranging for initial sale and cutting of the trees, transporting them to distant markets, and displaying them on retail sales lots for a concentrated sales effort during this brief period.

Growers should expect to spend a great deal of time marketing their trees. This includes finding a buyer, arriving at an agreement on price and terms of sale, and arranging for help in cutting, bundling, and transportation of the trees. A few growers have overcome difficulties of wholesale marketing by regularly operating their own city retail yards, but experience and business ability are needed for success in this type of work.

Prices

In 1957, retail prices for Christmas trees in the Pacific Northwest averaged almost 10 times reported stumpage prices (table 1).

The Portland market had a surplus of poor trees. Many trees tagged with a \$4 price, especially on the smaller lots, could be purchased for half that amount or less. Some sales at \$.50 a tree were noted, although quality was usually poor. Good-quality trees, on the other hand, sold well from the start and their prices held firm.

Cutrate prices of about \$.50 a tree were noted occasionally in several cities. These were usually offered to attract customers to make other purchases in a regular retail store, or were a distress sale by cutters who found the market glutted. Usually they were poor-quality trees.

A western Oregon grower working with cultured natural stands received \$1.35 to \$2.00 per tree for top-quality Douglas-firs, bundled at the roadside.

Table 1.--Average price in the Pacific Northwest,
for a 6-foot Christmas tree, 1957

Species	: : Stumpage	: : Roadside	: : Wholesale	: : Retail ^{1/}
Oregon:				
Douglas-fir	\$.30	\$.65	\$.90	\$ 2.50
Grand fir	.45	.90	1.50	3.75
Other true firs	.65	--	--	5.50
Ponderosa pine	.20	.75	--	5.00
Lodgepole pine	.30	--	1.80	4.00
Sitka spruce	--	--	--	2.75
Engelmann spruce	--	--	--	3.00
Washington:				
Douglas-fir	.25	.45	.70	2.25
Grand fir	.30	.50	.90	3.50
Other true firs	.40	--	--	6.00
Ponderosa pine	--	--	--	5.50
Lodgepole pine	.30	--	--	2.50
Sitka spruce	--	--	--	1.00
Western white pine	.40	--	--	2.50

^{1/} Revised from preliminary estimate released in March 1958.

One Willamette Valley wholesaler paid \$.35 a tree as stumpage for unmanaged Douglas-firs, and \$.50 to \$.60 each as stumpage for managed trees. Another Willamette Valley wholesaler paid \$3.50 per bale for Douglas-firs of the following sizes:

2 to 3 feet, 8 trees per bale
3 to 4 feet, 6 trees per bale
5 to 6 feet, 4 trees per bale
7 to 8 feet, 3 trees per bale
9 to 10 feet, 2 trees per bale
11 to 12 feet, 1 tree per bale

Average stumpage price of Christmas trees cut in commercial sales on national forests was \$.52 per tree.

Christmas trees add to the holiday spirit. Large trees are often in demand for display in public places.



Painted trees add variety to the sales lot.

Boy Scout troops and service clubs are an important sales outlet for Christmas trees.



Sales

Consumers accepted a greater variety of trees than in past years. Modern styles in housing and home furnishing have created a demand for different and unusual styles in Christmas trees as well. Although the traditional 4- to 6-foot Douglas-fir is still the most popular tree in western markets, more people each year are achieving special effects by using a tree of different species, or one that has been colored or flocked for artificial snow effects. Such trees sold well, especially in floral shops and in sales yards with a large assortment.

Lodgepole pine and the true firs were the most popular flocked trees. A few incense-cedars were seen in Portland markets. Well-formed western white pine offered in eastern Washington sold well. Dealers have realized a higher profit on the true firs, pines, and flocked trees, and therefore have tended to push sales of these types.

Noble fir and east side firs (from east of the Cascade summit) continued to bring premium prices. Ponderosa pine and lodgepole pine are growing in popularity but are difficult to handle and must be of particularly good form to sell.

In the past, trees have not been sold on any formal grading system, although better quality trees have usually brought higher prices. It is believed that the newly developed U. S. standards for Christmas trees will bring greater emphasis on production of quality trees in the future.

Several retail dealers were noted who also bought and sold trees at wholesale. In addition, some dealers operated a chain of several retail lots.

Customers seemed attracted to sales lots with a large variety of species and sizes and a covered area for painted trees and decorative greens. A display of premium trees with full foliage, long needles, and good color also helped attract customers. In contrast, sales lots seemed to do poorly when stocked with only west side Douglas-firs of poor or average quality.

Some neighborhood grocery stores offered a free tree with every purchase over a certain amount, or gave a "tree card" with every \$5 purchase. The number of tree cards presented at the store

lot determined the size of tree given to the customer. A few service stations offered Christmas tree specials, or gave trees to their regular customers. This type of competition is expected to increase.

Many trees sold in southeastern Washington were brought from Idaho. About half of the trees sold in Skagit, Whatcom, and Snohomish counties in Washington were Canadian trees. One Portland lot displayed 1,400 Montana trees.

Choose-and-cut or U-pick sales continued to grow in popularity, although sales volume was still relatively low. These sales have a threefold appeal--people enjoy selecting their own tree in the woods; they are assured of a freshly cut tree; and bringing in the Christmas tree can be a family event, especially appealing to families with young children.

Adequate publicity appears necessary in conducting choose-and-cut sales. City newspapers will often run an illustrated feature article on this activity, but arrangements must be made well in advance. Road signs are needed to direct potential buyers to the area.



Children enjoy selecting the family Christmas tree.



Choose-and-cut sales assure a freshly cut tree.

Shipments

The following tabulation shows number of trees shipped from Washington, as reported to the Washington State Department of Natural Resources:

<u>Destination of trees</u>	<u>Number</u>
Arizona	11,852
California	913,709
Cuba	4,004
Hawaii	14,926
Oregon	32,713
Undesignated	<u>223,216</u>
Total shipped out of State	1,200,420

Truck shipments from Washington to California, the principal market, were predominantly Douglas-fir, whereas those from Oregon were predominantly white fir and the other true firs (tables 2 and 3).

Table 2.--Truck shipments of Christmas trees
from Washington counties to California, 1957

<u>County</u>	<u>: Douglas-fir</u>	<u>: White fir and : other true firs</u>	<u>: Pines and : other species</u>
Chelan	60	--	--
Clallam	8,049	1,000	--
Cowlitz	430	--	--
Grant	450	80	--
Grays Harbor	--	719	--
King	3,815	--	--
Kitsap	110,074	10,379	--
Klickitat	922	11,048	--
Lewis	4,016	2,500	--
Lincoln	110	390	--
Mason	64,635	6,800	--
Pend Oreille	--	9,000	1,000
Pierce	14,209	3,355	650
Snohomish	800	--	8
Skamania	1,400	--	--
Spokane	--	3,250	--
Stevens	2,025	450	--
Thurston	15,631	775	--
Whatcom	575	193	--
Total	227,201	49,939	1,658

Source: University of California, Agricultural Extension Service.

Table 3.--Truck shipments of Christmas trees from
Oregon counties to California, 1957

County	: Douglas-fir :	: White fir and : : other true firs :	: Pines and : : other species :
Baker	--	1,000	--
Benton	179	4,000	--
Clackamas	1,020	1,300	275
Coos	4,514	3,400	7,995
Crook	--	1,165	91
Curry	200	--	21,832
Deschutes	300	24,760	2,747
Douglas	34,580	6,970	538
Grant	241	25,722	1,375
Harney	--	11,936	--
Hood River	2,218	1,000	--
Jackson	15,984	7,232	150
Jefferson	95	--	30
Josephine	65,901	6,730	245
Klamath	1,725	65,223	13,458
Lake	--	33,197	1,505
Lane	24,877	7,796	513
Linn	8,244	2,578	25
Malheur	--	8,499	1,200
Marion	4,531	3,590	--
Multnomah	1,018	406	--
Polk	4,248	1,116	--
Tillamook	800	--	--
Umatilla	--	4,350	--
Union	--	650	--
Washington	1,865	600	--
Wheeler	--	4,400	--
Yamhill	1,660	850	--
Undesignated	1,200	1,200	50
Total	175,400	229,670	52,029

Source: University of California, Agricultural Extension Service.

Destinations of rail shipments of Christmas trees in 1957, reported by individual rail carriers, were as follows:

<u>Railroad and destination</u>	<u>Number of Cars^{1/}</u>
---------------------------------	------------------------------------

Washington

Great Northern:	
California	15
Michigan	1
Missouri	1
New York	1
Northern Pacific:	
Arizona	3
California	168
Export	4
Texas	2
Spokane, Portland, and Seattle:	
California	2
Union Pacific:	
California	6
Kansas	4
Nebraska	1
Undesignated:	
Arizona	3
California	<u>28</u>
Total	239

Oregon

Southern Pacific:	
California	15

^{1/} At an estimated 4,750 trees per car.

Trees must be cut and prepared for shipment on a carefully prepared schedule so as to arrive at their destination on time.



Originating stations for rail shipments, as reported by individual rail carriers, are shown in the following tabulation:

Washington

Bayshore	Chehalis	Puyallup
Belfair	Chewelah	Shelton
Bremerton	Colville	Titlow
Bingen	Newport	Underwood
Castlerock	Olympia	Winlock
Centralia	Purdy	Yelm

Oregon

Bly	Klamath Falls
Corvallis	Lakeview
Diamond Lake	Roseburg
Eugene	Veneta

PRODUCTION

The estimated 1957 production of Christmas trees in the Pacific Northwest was 2.7 million trees, of which 1.8 million came from Washington and 0.9 million from Oregon (table 4). These figures include trees cut for market and an estimate of trees cut by individuals for their own use. Three-fourths of the Washington trees were cut from private nonfarm lands, mostly owned by specialized Christmas tree companies or other forest industries. Oregon had a higher proportion than Washington of trees coming from farmers and from public lands (table 5).

In Oregon, the greatest production was in Klamath County, followed closely by that in Josephine County; in Washington, Mason County was the leading producer by a wide margin (tables 6 and 7).

Table 4.--1957 Christmas tree production in the Pacific Northwest

Item	Oregon	Washington	Pacific Northwest
	----- <u>Number</u> -----		
Used within the State	362,580	565,140	927,720
Shipped out of State	529,140	1,200,420	1,729,560
Total	891,720	1,765,560	2,657,280

Table 5.--Type of ownership from which Christmas trees cut

Item	Oregon	Washington	Pacific Northwest
	----- <u>Percent</u> -----		
Farms	35	19	24
Other private lands	49	76	67
Public lands	16	5	9
Total	100	100	100

Table 6.--Oregon Christmas tree production, 1957

(Number of trees)

County	Total	Douglas- fir	White fir and grand fir	Noble fir & Pacific silver fir	Shasta red fir	Pon- derosa pine	Lodge- pole pine	Other ^{1/}
Benton	20,000	15,000	5,000	--	--	--	--	--
Baker	5,910	4,380	1,500	--	--	--	30	--
Clackamas	53,800	45,000	2,200	6,400	--	--	100	100 (W)
Clatsop	2,580	1,280	1,000	50	--	--	--	250 (SS)
Columbia	5,520	4,340	1,180	--	--	--	--	--
Coos	17,820	7,820	2,000	--	--	--	8,000	--
Crook	4,660	2,440	2,130	--	--	70	20	--
Curry	23,000	1,000	--	--	--	--	22,000	--
Deschutes	40,370	1,000	29,000	1,000	--	1,570	7,800	--
Douglas	66,780	53,880	10,000	380	2,320	--	150	50 (IC)
Grant	41,300	2,890	31,740	--	--	--	6,670	--
Harney	13,500	--	13,500	--	--	--	--	--
Hood River	5,000	3,680	940	380	--	--	--	--
Jackson	37,000	28,000	3,000	--	3,000	--	2,000	1,000 (SP)
Jefferson	3,000	100	2,850	--	--	--	--	50 (IC)
Josephine	107,000	86,000	5,000	--	1,000	10,000	--	20 (IC) 4,980 (SP)
Klamath	115,100	20,500	68,000	--	10,000	--	16,600	--
Lake	28,000	--	25,000	--	--	--	3,000	--
Lane	77,800	57,500	19,000	400	--	--	800	100 (IC)
Lincoln	10,500	10,400	--	--	--	--	100	--
Linn	10,810	8,500	1,900	380	--	--	--	30 (ES)
Malheur	10,000	--	8,800	--	--	--	1,200	--
Marion	67,000	58,000	5,000	4,000	--	--	--	--
Morrow	1,000	750	250	--	--	--	--	--
Multnomah	4,700	1,000	--	3,700	--	--	--	--
Polk	81,000	64,000	14,000	3,000	--	--	--	--
Sherman	--	--	--	--	--	--	--	--
Tillamook	3,150	3,000	--	--	--	--	150	--
Umatilla	6,000	1,500	4,500	--	--	--	--	--
Union	4,850	2,000	2,500	--	--	--	50	300 (ES)
Wallowa	2,000	1,000	1,000	--	--	--	--	--
Wasco	6,480	4,670	1,230	140	--	250	190	--
Washington	6,590	5,150	1,000	340	--	100	--	--
Wheeler	4,600	200	4,400	--	--	--	--	--
Yamhill	4,900	3,900	1,000	--	--	--	--	--
Total	891,720	498,880	268,620	20,170	16,320	11,990	68,860	6,880
Percent	100.0	56.0	30.1	2.3	1.8	1.3	7.7	0.8

^{1/} Symbols used: W Western white pine
SS Sitka spruce
IC Incense-cedar
SP Sugar pine
ES Engelmann spruce

Table 7.--Washington Christmas tree production, 1957

(Number of trees)

County	Total	Douglas- fir	White fir and grand fir	Noble: fir	Pacific silver fir	Pon- derosa pine	Lodge- pole pine	Other ^{1/}
Asotin	250	130	120	--	--	--	--	--
Chelan	7,580	6,310	--	--	1,140	130	--	--
Clallam	22,780	13,360	7,950	--	1,220	--	--	250 (W)
Clark	13,360	12,700	660	--	--	--	--	--
Columbia	1,050	530	520	--	--	--	--	--
Cowlitz	13,400	12,700	700	--	--	--	--	--
Ferry	12,000	12,000	--	--	--	--	--	--
Garfield	250	60	60	--	--	--	--	130 (SF)
Grays Harbor	7,900	5,550	--	--	1,340	--	--	370 (W)
Island	1,820	1,760	--	--	--	--	--	640 (SS)
Jefferson	2,420	2,320	--	--	--	--	--	60 (W)
King	5,720	5,720	--	--	--	--	--	100 (W)
Kitsap	321,640	302,380	12,960	--	--	--	2,000	4,300 (W)
Kittitas	3,340	2,300	--	280	760	--	--	--
Klickitat	26,310	7,630	15,250	--	3,430	--	--	--
Lewis	28,210	22,260	3,180	--	--	--	2,770	--
Lincoln	640	140	500	--	--	--	--	--
Mason	1,011,250	989,820	8,140	--	--	--	9,600	3,690 (W)
Okanogan	9,740	8,650	640	--	--	--	190	260 (ES)
Pacific	2,620	2,300	--	--	--	--	--	320 (SS)
Pend Oreille	31,590	24,170	6,420	--	--	--	1,000	--
Pierce	89,120	82,690	6,430	--	--	--	--	--
San Juan	760	760	--	--	--	--	--	--
Skagit	5,910	5,910	--	--	--	--	--	--
Skamania	16,820	13,000	1,300	1,250	--	1,270	--	--
Snohomish	11,960	11,960	--	--	--	--	--	--
Spokane	10,810	6,360	4,450	--	--	--	--	--
Stevens	57,310	50,890	6,420	--	--	--	--	--
Thurston	39,160	36,890	1,270	--	--	--	1,000	--
Wahkiakum	1,530	1,530	--	--	--	--	--	--
Walla Walla	630	150	320	--	--	160	--	--
Whatcom	3,430	2,540	640	--	--	--	--	250 (W)
Yakima	4,250	3,610	320	--	320	--	--	--
Total	1,765,560	1,649,080	78,250	1,530	8,210	1,560	16,560	10,370
Percent	100.0	93.5	4.4	0.1	0.5	0.1	0.9	0.5

^{1/} Symbols used: W Western white pine
SF Subalpine fir
ES Engelmann spruce
SS Sitka spruce

Principal Species

Fifty-six percent of the Oregon trees cut were Douglas-fir, 30 percent were white fir or grand fir, and 8 percent were lodgepole pine. Although noble fir and Shasta red fir accounted for only 4 percent of Oregon production, analysis of sales showed these species to bring the highest prices. In Washington, Douglas-fir represented 94 percent of the trees cut, with white fir and grand fir accounting for 4 percent.

Although a number of other species were cut in the two States, their proportions were relatively minor. Still, availability of these species added greatly to consumer satisfaction as it permitted a wide scope of departure from traditional species in the search for unusual creative effects in home and commercial decoration.

Trees From National Forests

Production of Christmas trees from national forests in 1957 totaled 103,635 in Oregon and 7,798 in Washington (table 8). This amounted to approximately 4 percent of total production in the two States. Ninety percent of the trees sold from Oregon national forests were in the central and eastern parts of the State. The Malheur, Fremont, and Deschutes National Forests were the main producers. True firs made up most of the cut, although an increasing amount of lodgepole pine is also being cut. The true firs usually occur as understory competition to ponderosa pine, and their removal has helped facilitate regeneration of the more valuable pine. Christmas trees were usually sold on a per-tree basis within a designated area. West side Christmas tree sales on national forests were mainly in alpine and subalpine types unsuited for sawtimber production.

Plantations and Cultural Treatment

The existing area of Christmas tree plantations in the two States comprised more than 4,000 acres (table 9). This represented a 52 percent increase since 1955. The greatest acreage of plantations in Oregon was held by farmers. In Washington, plantations owned by specialized Christmas tree companies, industrial tree farms, or other nonfarm owners predominated.

Production in Washington in 1957 was about equally divided between uncultured natural stands and natural stands under some form of cultural treatment. Production in Oregon was nearly all from

Table 8.--1957 Christmas tree production in the
national forests of the Pacific Northwest

State	East side ^{1/}	West side ^{1/}	Total
-----Number-----			
Oregon	92,408	11,227	103,635
Washington	3,235	4,563	7,798
Total	95,643	15,790	111,433

^{1/} Relative to Cascade summit.

Table 9.--Estimated area of existing Christmas tree
plantations in the Pacific Northwest, 1957

Type of plantation	Oregon	Washington	Total
-----Acres-----			
Planted on farms	1,753	760	2,513
Planted on other private lands	491	1,100	1,591
Total	2,244	1,860	4,104

uncultured natural stands. Relatively few trees were cut from plantations. Type of stand from which trees were cut is shown as follows:

	Oregon (Percent)	Washington (Percent)
Natural stands	93	49
Cultured natural stands	6	51
Plantations	1	(1/)
Total	100	100

^{1/} Less than 0.5 percent.

GENERAL OBSERVATIONS

Oregon

Clackamas County. -- One team of two men manages some 300 acres of their own, and another 300 acres in the noble fir area of a large timber company. They help many of their neighbors with cultural practices on another 600 acres. Production from these lands has averaged 5,000 to 15,000 trees per year for the past 10 years. They work in logging part of each year, but have an eye to the future when they can spend full time on their own tree farms.

Deschutes County. -- One operator cuts trees from a large industrial tree farm and also bids on national-forest Christmas tree stumpage. He ships about 20,000 trees to California each year, has his own lot in the Los Angeles area, and also sells wholesale.

Grant County. -- A local rancher cut 1,500 white fir and decked the trees along the road, asking \$1 each from wholesalers. He was unable to get this price and finally trucked the trees to California himself.

Jackson County. -- The Southern Oregon Christmas Tree Association has attempted to interest its members in consolidating their trees for marketing. There are also a number of independent seasonal operators who cut and haul trees to California markets. Unemployment in the lumber industry during 1957 resulted in increased interest in Christmas tree harvesting and selling as a means of supplementing income.

Josephine County. -- A grower near Grants Pass has combined Christmas tree growing with logging and cattle raising on 470 acres. He also cultures Christmas trees on 660 acres owned by others. He combines his Christmas tree work with other timber stand improvement work, including thinning under the Agricultural Conservation Program of the U. S. Department of Agriculture. His annual cut has averaged 8,000 trees.

Marion County. -- One landowner prunes and thins young natural stands. This year a local buyer would agree to take only 100 Christmas trees at a time, so the landowner took his crop of 800 trees to California and made \$800 over and above expenses for the trip.

Wasco County. -- Two landowners contracted with cutters to thin young stands of Douglas-fir to give growing space for future timber trees. A good job was done in this instance, but a considerable amount of supervision was needed to prevent overcutting of potential timber trees.

Wheeler County. -- Due to spruce budworm damage, very few white fir and Douglas-fir trees were available this year.

Washington

Clallam County. -- There are no Christmas tree growers in Clallam County, although growing conditions appear good. All trees sold in this county came from natural stands, and in only a few cases was stumpage paid.

Kitsap County. -- One operator is a combination grower and retailer. He deals in high-quality farmed and fertilized trees. When he selects a tree to go on the market, he tags it and applies fertilizer to improve the color. These trees bring a better price on his retail lot in Seattle.

Mason County. -- Several large-scale operators center their activities in Mason County. They are both growers and wholesalers, shipping in carload lots. A good deal of the success of these firms stems from their experience and skill in large-scale wholesaling operations, which are nearly a year-long activity and which are carried on apart from their growing and cutting operations. Several thousand acres of naturally stocked young stands are under cultural treatment in Mason County. Mechanized packing and loading operations are widely used.

Walla Walla County. -- A single producer is active in this county, providing for his own lot in Walla Walla. Eight other lots operated in 1957 with trees shipped in from western counties in the State. All dealers reported a noticeably smaller demand for trees. This was partly due, they felt, to the open winter, which allowed more families to cut their own trees.

PROBLEMS OF THE SMALL GROWER

Inexperienced producers continued to find difficulty in marketing their trees. Chief problems have stemmed from poor contact with buyers, distant markets, and a short season. Where large-scale operators are available nearby, it is usually possible to sell directly to such persons, who then market the trees with their own.

Concentration yards maintained by large operators were available in 1957 in Klickitat, Mason, and Thurston counties in Washington. One in Lewis County closed early due to a poor supply of trees. None were available in Oregon.

Lacking an available concentration yard, the individual grower or producer may have to make his own arrangements for selling his trees. Some have been able to find a buyer by making inquiry among other growers. Others have tried inserting classified advertisements in the newspapers, but this has often proved disappointing. Still others have trucked their trees to principal western cities, such as Los Angeles, San Francisco, Portland, or Seattle, where wholesale distributors may be found. However, the seller is usually at a disadvantage in such a situation, and may have to accept what he considers an unfavorable price or attempt at the last minute to set up a retail lot or roadside stand of his own. Such action often results in cutrate prices, which are damaging to the entire industry.

Names of wholesale dealers may often be found by referring to the classified section of the telephone directory for principal cities. It is difficult, however, to arrange a firm commitment with a distant buyer until he has seen the trees or knows through previous transactions the amount and quality of trees the individual grower is able to provide.

Each year the Northwest Christmas Tree Association and the State Foresters receive inquiries from wholesale buyers, and they have provided a worthwhile service in directing them to local growers. The principal difficulty has been lack of sufficient information on amount, quality, and availability of trees from individual growers. Another difficulty is that wholesale buyers may be interested in car-load quantities, which the individual grower may not be able to supply.

If the producer is near a city of any size, it is usually possible to arrange for direct delivery to retail dealers or jobbers. A good time to do this is during one Christmas season in preparation

for the next. That is, buyers or outlets for Christmas trees seem to disappear immediately after December 25 and often cannot be located again until the next year's retail sales have begun. By then it may be too late to make sales and delivery, except on an emergency basis.

When dealing with distant buyers and distant markets, it is essential to make sales arrangements well in advance, preferably by October 1.

Some growers lack sufficient knowledge as to what makes a good Christmas tree and depend too much on simply cutting wild trees, only a few of which may be expected to have good form, density, and color. Unsold trees on retail lots consist largely of such trees, which are becoming harder to sell each year in competition with top-quality trees from cultured stands. Basic cultural measures consist of pruning, thinning, shearing, and scarring.

The grower should select the species of Christmas trees that are suited to his growing site and that are readily accepted by the public. Culture of untried or low-demand species should be considered only on a trial basis until their market demand, disease and insect resistance, and response to planting site can be more fully determined. Even within a single species, such as Douglas-fir, a wide variation of strains is recognized, each with different inherited characteristics. The safest course of action for the grower is to obtain stock from seed collected in the same general locality as his plantation. Some Northwest growers have found difficulty in obtaining suitable planting stock. State and private nurseries are aware of this shortage and are increasing production to meet the demand.

Selection of a desirable Christmas tree growing site is important. Failures in culturing native trees on the better sites have been caused by the combined factors of excessive annual height growth and hardwood competition. Attempts to control these factors may result in much wasted effort. Such land may be better adapted to growing timber than Christmas trees. On the other hand, extremely poor sites may not produce Christmas trees of good vigor, needle density, or color.

Trespass continues to be a problem to growers with trees near public roads. Continued public education and stronger legislation aimed at preventing trespass of minor forest products appear to be the best long-range solutions.

The grower should examine his trees frequently to determine what cultural measures may be needed to improve form and quality.



Pruning slows growth and encourages denseness in the remaining crown.

CONCLUSION

Christmas trees are becoming an important commercial crop in the Pacific Northwest. This is due partly to the growth of population and corresponding markets in the west, and partly to a realization on the part of many landowners that Christmas trees can be a valuable product of their land.

Although most Christmas trees still grow in a wild or semi-wild state, there is a growing recognition of the benefits to be gained by managing certain lands primarily for Christmas trees, or for Christmas trees as a supplementary product on an area devoted primarily to some other form of land use. Examples of the latter are powerline rights-of-way and high-elevation or mixed-species timber areas.

Christmas trees are traditionally a part of the holiday season, and a ready-made market exists. Growing or cutting Christmas trees as a successful business undertaking, however, requires knowledge of marketing methods and business skill in selling the trees, either at wholesale or retail level.

